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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/623,481	09/14/2000	Toshio Yamagiwa	P107348-0004	2402

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EXAMINER

FISCHER, JUSTIN R

ART UNIT	PAPER NUMBER
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1733

DATE MAILED: 05/02/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

mk-7

Office Action Summary

Application N .

09/623,481

Applicant(s)

YAMAGIWA, TOSHIO

Examiner

Justin R Fischer

Art Unit

1733

-- The MAILING DATE of this communication appears n the cover sheet with the c rrespondence address --

Period for R ply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 14 September 2000 .
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-8 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,3 and 8 is/are rejected.
- 7) ☒ Claim(s) 2 and 4-7 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____ .
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 5,6 .
- 4) ☐ Interview Summary (PTO-413) Paper No(s). _____ .
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____ .

DETAILED ACTION

Double Patenting

1. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

2. Claims 1, 3, and 8 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 5 and 1 of copending Application No. 09/585,402 in view of Harrington. Claim 5 of Application 09/585,402 is directed to a method of forming a sealant-incorporated tire in which an anti-adhesive sheet is disposed between adjacent tire materials to prevent bonding from each other. Furthermore, claim 5 defines a step of injecting a sealant into the annular sealant chamber, thereby dissolving the anti-adhesive sheet. The claim, however, does not specifically define one of the tire materials as the "innerliner" and also does not suggest the "bonding of at least a part of said innerliner to the inner surface of the tire". In any event, this design represents the conventional technique used to form annular sealant chambers between the innerliner and the adjacent tire body. For example, Harrington teaches a method of forming a similar, sealant-incorporated tire in which an anti-adhesive sheet is disposed between a pair of air-impervious layers or innerliners,

Art Unit: 1733

such that the anti-adhesive sheet has a smaller width than said pair of innerliners to allow the edges of said innerliners to bond during vulcanization (Column 3, Lines 20-25). Thus, it would have been obvious to one of ordinary skill in the art at the time of the invention to form the annular sealant chamber adjacent the innerliner and bond at least the edges of the adjacent tire materials, as suggested by Harrington, since (a) sealant chambers are conventionally incorporated in a region between the innerliner and the tire body and (b) the edge bonding of adjacent tire materials provides a pair of barriers that defines the intrinsic structure of the annular sealant chamber or pocket. This is a provisional obviousness-type double patenting rejection.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(f) he did not himself invent the subject matter sought to be patented.

(g)(1) during the course of an interference conducted under section 135 or section 291, another inventor involved therein establishes, to the extent permitted in section 104, that before such person's invention thereof the invention was made by such other inventor and not abandoned, suppressed, or concealed, or (2) before such person's invention thereof, the invention was made in this country by another inventor who had not abandoned, suppressed, or concealed it. In determining priority of invention under this subsection, there shall be considered not only the respective dates of conception and reduction to practice of the invention, but also the reasonable diligence of one who was first to conceive and last to reduce to practice, from a time prior to conception by the other.

4. Claims 1 and 8 are rejected under 35 U.S.C. 102(b) as being anticipated by Harrington (US 3,930,528). Harrington discloses a pneumatic tire having a lubricant composition in an annular sealant chamber or pocket that is integrally formed within the

Art Unit: 1733

tire structure (Abstract and Column 1, Lines 59-63). In describing said annular sealant chamber, Harrington describes the use of a band of anti-adhesive material, which is analogous to the mold release sheet of the claimed invention, between a pair of air-impervious layers or innerliners (Column 3, Lines 21-25). It should also be noted that Harrington suggests that the anti-adhesive sheet has a smaller width than the adjacent innerliners, such that the edges of said innerliners are bonded together to form said chamber during vulcanization (Column 3, Lines 20-25 and Column 5, Lines 45-49).

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 1 and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Admitted Prior Art (Page 1, Line 12 – Page 2, Line 5) in view of Harrington. The Admitted Prior Art states that a conventional sealant-incorporated tire is formed by applying a mold release agent to a part of the contact surfaces of the innerliner and the tire body. However, the reference is silent with respect to the use of a mold release sheet. In any event, one of ordinary skill in the art at the time of the invention would have readily appreciated additional means of application for the mold release agent. For example, Harrington is directed to a similar sealant-incorporated tire in which an anti-adhesive band is sandwiched between a pair of innerliner layers, such that said anti-adhesive band can be applied by brushing when the anti-adhesive material is

Art Unit: 1733

solution form or it may be applied in the form of a strip or sheet of material (Column 3, Lines 56-65). Thus, it would have been obvious to one of ordinary skill in the art at the time of the invention to apply the mold release agent described by the Admitted Prior Art as a sheet of material, as suggested by Harrington, since a plurality of application means, such as brushing/coating and sheeting, are well known and conventional in the tire industry to form an annular sealant chamber.

7. Claims 1, 3, and 8 are provisionally rejected under 35 U.S.C. 103(a) as being obvious over copending Application No. 09/585,402 which has a common inventor with the instant application. Based upon the earlier effective U.S. filing date of the copending application, it would constitute prior art under **35 U.S.C. 102(e), if published or patented, 35 U.S.C 102 (f), and 35 U.S.C. 102 (g)**. This provisional rejection under 35 U.S.C. 103(a) is based upon a presumption of future publication or patenting of the conflicting application. Claim 5 of Application 09/585,402 is directed to a method of forming a sealant-incorporated tire in which an anti-adhesive sheet is disposed between adjacent tire materials to prevent bonding from each other. Furthermore, claim 5 defines a step of injecting a sealant into the annular sealant chamber, thereby dissolving the anti-adhesive sheet. The claim, however, does not specifically define one of the tire materials as the "innerliner" and also does not suggest the "bonding of at least a part of said innerliner to the inner surface of the tire". In any event, this design represents the conventional technique used to form annular sealant chambers between the innerliner and the adjacent tire body. For example, Harrington teaches a method of forming a similar, sealant-incorporated tire in which an anti-adhesive sheet is disposed between a pair of air-impervious layers or innerliners, such that the anti-adhesive sheet

Art Unit: 1733

has a smaller width than said pair of innerliners to allow the edges of said innerliners to bond during vulcanization (Column 3, Lines 20-25). Thus, it would have been obvious to one of ordinary skill in the art at the time of the invention to form the annular sealant chamber adjacent the innerliner and bond at least the edges of the adjacent tire materials, as suggested by Harrington, since (a) sealant chambers are conventionally incorporated in a region between the innerliner and the tire body and (b) the edge bonding of adjacent tire materials provides a pair of barriers that defines the intrinsic structure of the annular sealant chamber or pocket.

This provisional rejection might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the copending application was derived from the inventor of this application and is thus not the invention "by another," or by a showing of a date of invention for the instant application prior to the effective U.S. filing date of the copending application under 37 CFR 1.131. For applications filed on or after November 29, 1999, this rejection might also be overcome by showing that the subject matter of the reference and the claimed invention were, at the time the invention was made, owned by the same person or subject to an obligation of assignment to the same person. See MPEP § 706.02(I)(1) and § 706.02(I)(2).

Regarding the applicability of this art under 35 U.S.C. 102 (f) and 35 U.S.C. 102 (g), it is noted that although the copending applications have a common inventor, the applications do not appear to have a common assignee. Thus, in this instance, (a) the inventive entities of the copending applications are different and (b) the copending applications appear to not have been commonly owned at the time of the present invention as their assignee entities are different, wherein

“common ownership” requires that the person, persons, or organization own 100 percent of the subject matter and 100 percent of the claimed invention (MPEP 706.02(I)(2)).

Allowable Subject Matter

8. Claims 2 and 4-7 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. There was no reference in the prior art search that disclosed a method of forming a sealant-incorporated tire comprising the steps of (a) disposing a mold release sheet between an innerliner and an adjacent surface of the tire body, such that the edges of said innerliner and adjacent surface of the tire body are bonded during vulcanization, wherein a first surface of said mold release sheet has a “mold release property” and a second surface of said mold release sheet is devoid of a “mold release property”. In this instance, the second surface is bonded to a surface of the annular chamber as a result of being devoid of a “mold release property”. Also, there was no reference in the prior art search that suggested the inclusion of a mold release sheet that is formed of a material soluble in a sealant, such that said mold release sheet dissolves into the sealant upon injection into the annular chamber. Regarding the limitation of using a plurality of mold release sheets (dependent on claim1), Harrington discloses a preferred embodiment in which two bands of ant-adhesive material are applied to the innerliner (Column 3, Lines 5-8). However, in this instance, it appears that the anti-adhesive bands are being applied adjacent one another rather than being stacked or laminated one on another. Thus, Harrington does not suggest the inclusion of a plurality of mold release sheets or anti-

Art Unit: 1733

adhesive bands. Lastly, there was no teaching in the prior art search that suggested the manufacture of said mold release sheet in a corrugated orientation in order to optimize the mold release sheet upon expansion of the innerliner during vulcanization.

Conclusion

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Justin R Fischer** whose telephone number is **(703) 605-4397**. The examiner can normally be reached on M-F (7:30-4:00).


If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Ball can be reached on (703) 308-2058. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9310 for regular communications and (703) 872-9311 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.



Justin Fischer

April 29, 2002



Michael W. Ball
Supervisory Patent Examiner
Technology Center 1700